

Dr. Laura Nelson:

- Welcome and introductions
- We have differences of opinion, but if we can come together and find where we agree and find solutions in a positive way, then we can define successful strategies
- Thank you to our sponsors, SWCA. The topic for this forum is “Creative Solutions in Oil and Gas.”
- First, we will cover the recent legislation and update on legislative activity.

Legislative Update: (Representative Hunsaker, Barrus, and Becker)

- We are appreciative of the involvement of the people here and for the Energy Policy Workgroup and those who worked with the Governor’s office and Dr. Laura.
- Much focus was given in the past year to conservation, energy efficiency and tax incentives
- Rep. Hunsaker sponsored State Fleet Efficiency requirements and it passed. This covers fuel efficiency and saving costs of energy.
- Energy Policy Amendments: These highlight the importance of including energy in the educational system. We are training those who will be working in the industry in the future: Children K-12. Teach to recognize the full picture, using energy, conservation, development, and where energy is from. We also added hydro-electric.
- Rep. Barrus sponsored revolving loan fund for energy efficiency projects for schools. This one is similar to the ones for the State building from last year that has been so successful. The revolving loan fund is for better energy efficiency and school energy programs
 - The funds saved from decreased costs of energy will pay back the loan.
- A good coordinated plan for the next legislative session is needed for what we will want to accomplish with the energy bills and this will help to ensure success. We try to focus on bills that accomplish more than one thing. A cooperative plan, hopefully under one bill, one umbrella. Please let us know if you have things you want in those bills, we want to hear from you.
- Rep. Hunsaker: The Public wants guidance and leadership in energy and are looking at you in the energy industry, you have special insight into what needs to be done and ways to be more efficient and make some significant differences. We need your input and direction, as an energy forum, to analyze what we need to do to further implement our state energy policy. It has been two years since the energy policy passed. It was a great framework and we have direction on what we want to accomplish. Now we need to answer, how do we accomplish it? And that is where we need your expertise and experience. Efficiency in our State Fleet is a companion bill to the State Energy Building Efficiency. Thanks to Curtis Clark and DFCM. There has already been tremendous savings: millions of dollars. Curtis Clark has a plateful of issues that are generating energy savings. We want to do the same with Fleets. This is a huge budget: 4,000-5,000 vehicles and \$61,000,000 annually in energy expenditures. We are not asking people to do what the State government is not doing. We feel there is a lot more to be done and now is the time to do it.
- Rep Becker: This group has been working for quite some time, and Dr. Nelson is taking the lead. This group is a source of inspiration for what we get done in the State. We need your help for ideas, to develop those ideas, and help us refine to achieve the most successful policy

in this state. Energy Efficiency, Alternative/Renewable Energy, developing our traditional resources, and bringing benefits in an environmental and economic way in our state and for our communities. We can see millions and millions in savings and go to public education. We started a few years ago and have had great participation and progress, but we are not satisfied: more needs to be implemented and other topics addressed. Only so many get passed, the best way is to get started early, have the bill introduced and ready to go early in the session or before the session. The end of the session is a squeeze and that is the end of those bills. An early start, maybe under one big bill, before the interim committees can be much more successful and save the bills from experiencing the death of time.

- Question: Was one of those the Energy Efficiency Resolution? This was the victim of time and part political. Time was short and a lot of legislation was on the board, had to pull off for more bills.
- Question: Who administers the revolving loan fund?
 - UGS and State Energy Program will administer that fund. Phil Powlick is already working on it. It needs a little rule writing, but they are on top of it.

Selma Sierra, Director of BLM

- Balancing Access, Use, and Environmental Stewardship.
- Our mission: Plan for Public lands use and enjoyment for current and future use, provide access to resources, protect natural places, serve communities, and also economic. We play a critical role in energy, modernizing structure to meet demand, develop alternative and renewable energy, have a diverse portfolio, and have alternative sources to replace more traditional sources. In Utah, we want future energy production stable. We have the largest oil and natural gas resource in the lower 48 states.
- Multiple use mission: Multiple use doesn't have to choose between environment and energy. We can be innovative and environmentally responsible. BLM can provide protection while developing energy. We are committed to protecting special places, recreation and wildlife habitat. We have an interdisciplinary team: wildlife experts, biologists, petroleum engineers, archeologists, and recreation specialists. We look at land use and effect each use has on another, resource allocation, and the impacts of each one. We work with developers to find more innovative ways to develop these resources and use best management practices to minimize the imprint on the land. Best management practices will be brought more into force for companies to minimize impacts and really make it a temporary use of the area. We can do things right to get energy and protect Utah's other special values.
- A partnership exists here in Utah for conservation and developing. A new proposal called Healthy Lands Initiative: a landscape approach to really look at how we can make sure that the lands can be taken care of, habitat and wildlife, noxious weeds, water management and use, increasing public lands health. We encourage oil and gas to really get involved with this partnership that has been successful and really doing things that are showing benefit to the land.
- The actual surface disturbance of the 35 million acres is less than 30,000 for oil and gas—less than 1%. We are promoting mitigation on the surface, while still promoting energy.
- Some challenges I would like to addresses: internal process and getting challenged on all sides in court for issues that we disagree on. Most often the process and missed steps are the problem, and so we lose in these legal battles. We are looking internally at those weaknesses

to address those challenges. Keeping up with the current demand is a daily challenge. We still are not providing the Vernal office all the necessary support to have the APDS all reviewed and on schedule.

- An update on the land use planning process. We have currently 6 land use plans, and one of the things that stalled the progress is now back on track. We needed to go back and take a look at the process. The process was weak and flawed and so we are looking at it now. Informed decisions are the base of the leases, from a process perspective, to insure that they are done properly. We have the ambitious goal to complete by summer 2008. I look forward to working with all of you and building relationships so that we know where each other is coming from, and to the building to the benefit of this State and Nation.

Elizabeth Perry, SWCA

- I am the Program Director for SWCA. We bring together local agencies like BLM, interested members of the Public, and our clients. SWCA is primarily a company of scientists in the natural resources field to help clients through permitting and planning. The Vernal office primarily serves energy sector clients.
- We look at several things: Cultural resources; prehistoric and historical archeological sites; and traditional cultural properties. We use models a lot to help us plan, generate maps and models on existing data to expose significant areas of cultural history. Paleontological resources: these are the most overlooked and people are not used to dealing with them, but of increasing concern. We conduct surveys and monitor these resources. Biological resources: vegetation, special status plant species, threatened & endangered and candidate wildlife, sensitive wildlife, and migratory birds. We make sure there is clean water compliance including rivers, groundwater, and wetlands.
- Environmental assessments make up a lot of our work, and environmental impact statements. Monitoring is common at the end of the process to meet permit requirements, and to solve problems before they arise. We can address environmental concerns together with such solutions like area wide studies where people come together to fund large area study, and then it is already in place and can be drawn upon for various projects. We help with ADP turnaround time: BLM offices are overrun and if they need an EA they write it. So we have been submitting draft EAs with applications to permit. BLM will still have to review, but this significantly speeds up the process. We help with concerns and special interests: creative engagement because we have been working in the area and know these issues and concerns, and addressing those concerns. We arrange dialogues to formal meetings, develop solutions before developers have gone too far in the process and are surprised by an issue. We look at additional alternatives for BLM requests such as assessing directional drilling alternatives. Whether or not it ultimately becomes feasible, it is good to have options up front.

Jim Felton, Bill Barrett Corporation

- Bill Barrett Corporation is an exploration company, made of scientists. Utah has a huge competitive advantage in energy as it is an energy exporter. We are self reliant in natural gas. Budget surpluses are made from energy exports. Energy is our economy. We look at 2/3rds of the world's largest economy and it is fueled by discretionary funding. Energy, food, and housing are the only non-discretionary. When prices go up, discretionary funding goes down.

- The Oil and Gas industry in this country is not made up of the major players for the most part. It is comprised mostly of small businesses. They are the largest regional employers, average income 60% above the region's average, particularly in the rural regions. As the rural regions have the largest number of people living in poverty, this is important for them. Billions of dollars will be invested in the State of Utah. A single well will provide 15-20 jobs. There are national implications, too, and this has been a very important year for energy producers, particularly in the West. We are the #1 producer. If we are reliant on natural gas, we will need to rely on the Rockies. We surpass the Gulf, and the only one projected to show growth over the next 20 years. 90% of the energy is from traditional sources, with the projected estimate for the next 20 years being 80%. However, US will emerge as the largest importer of natural gas unless policies change. Energy security is national security. We need natural resources like solar and wind in Utah as well. Consumers need producers. All energy sources have environmental, social, and political implications as well.
- Take a look at history of Nuclear: the spent fuel in the last 60 years, would cover the area of a football field about 12 feet high. Can this country adequately protect that waste? Renewables are bigger and occupy more space. We need them to be more efficient: Four gallons of water for each gallon of ethanol. Renewable Portfolio Standards: what do you do if the sun doesn't shine or the wind blow? 80% of the cost of fertilizer is natural gas. We do need to drill more, but production is holding relatively flat. It is \$1,000 below 15 foot. If you start drilling deep wells: gas is too unpredictable to go that deep. Also land use policies require us to get in and get out; not enough time for a going deep.
- The growth rate of energy demand is forever increasing. You can conserve, which is definitely being done, and half the rate of energy and slow the rate of consumption, but hard pressed to reduce consumption numbers. More places are starting to return to their resources because of the political implications. Russia cut off natural gas from 5 areas. It is a natural gas cartel. The biggest oil is 51% owned by the Kremlin. Russia might be more powerful at the world stage right now than any other time in the world history because of natural resources. It is harder to replace reserves, only about 30% of 30 years ago. Producers have been reduced from about 13,000 to 2,000. Research and development are down as well. Leased lands provide financial benefits in severance taxes and royalties, etc. You have to have a positive drilling outlook to get investments; be able to reinvest 100% from money made. No additional inventory means no attracting that capital. Environmental Assessments can take two to three years and a couple millions of dollars. That is a barrier to smaller companies. To find resources and protect the environment is another 1 billion.
- BBC is actively engaged in environmental mitigation. On our most recent pilot project, we had 3 consultants to monitor the area, used a helicopter to minimize the roads, redid the roads, enhanced sage grouse habitat, and spent a million improving the safety of Nine Mile road. 2/3rds of the West is Federal lands. Several acts to protect Public and local lands. We had 12 tribes, 4 states, 3 counties, 13 federal agencies, and 14 organizations to help plan. We were still sued 5 times. We did win, but the problem was not that more regulations were needed, but more clear regulations. The social costs of regulation are more full time jobs going overseas and that especially hurts the rural communities. Policies, not markets, are making some of the highest natural gas prices. We have 100 lawyers for every 1 engineer graduating. Social benefits to energy supplies. Quality of life: jobs, money to contribute to causes and improve communities. A natural disaster will kill a few people here. In the 3rd world the same disaster will kill thousands.

Q&A:

- Does the Governor agree to your Oil and Gas and Renewable Energy views, Mr. Felton?
 - Felton: I cannot speak for the Governor, I can only inform of opportunity costs. Oil and Gas is extremely complex. Rural economies were founded by natural resource development, and are not floundering. Not a lot of service economy in these areas. We are losing our rural areas, or they are being forced to drive into urban areas. They are no longer able to use those natural resources for their economy.
 - The Energy Advisory Council is the full spectrum of Energy: Renewable, Alternative, Traditional, etc.
- I feel this has been a policy reality check. Partnership between conservation, environment, and development. How are we really going to get this down? The partners are in the front seat and one or another is taking a back seat to them. How do we create a good balanced partnership? It is responsible development or anything the State can do? I know our hands are tied on Federal lease.
 - Selma: As we look to land use planning, it is a good point for building relationship, getting public input and participation. We have to navigate through all the different challenges, but we must comply. My counterparts are looking at areas of where there already exist some developmental activity and how to maximize resource recovery in that are before moving into a new area. We have to look at environmental consequences. We will work with each other, talk with each other, and be able to develop new approaches to maintain these partnerships and meet obligations to provide resources and a nation powered by energy.
 - Liz: We can really move these efforts by localizing and keeping it regional. Finding the people on the ground and working with them. Federal lands in Utah 1% more than the nation. Those developments give \$15-20 dollars for every dollar BLM spends on them. Income brings infrastructure, environmental protection, etc. Large developments will demand more conservation and responsible development. Having everyone in the front seat and finding creative solutions and achieving the goals of land management agencies will protect resources in a positive fashion.
- There are frustrations at both ends of the spectrum, but we need to find ways to utilize those lands as directed and developers who spend money for our economic benefit and provide true mitigation and additional environmental benefits. We can do those simultaneously as we develop energy. A consultant should not be devalued: they are critical at this point and play into how we pursue our energy future, regional and federal energy needs. They are very professional scientist helping us find those who find our way.

Lt. Governor

- I appreciate Dr. Laura and what she does to coordinate and make sure we have the full spectrum and group to make policy. People have the same goals and aspirations in this country: Roof over our heads, warm place to go to, food in our bellies enough to sustain life, safety and safe streets for us and for our families, we would like to be able to enjoy life and our friends and family. There are many different ways to achieve those ends. This group is

representative of different ideas and how to do these things and address the issues. Not easy answers and we must have an appropriate balance between all the things we want and the one world in which to do it all. Production of energy is up, oil production is up. This is reflecting the demands of the world. China has 1.3 billion people and India has 1.2 billion, and the challenge is to provide energy needs and sustaining quality of life like that we have here in America.

- Utah has the 2nd lowest energy cost in the country because of the production being done here. Growth pressures are going to put more demand. Three main areas. We need to develop more areas in energy, including alternative and traditional. We need to do alternate energy in an economic way. We are going to have to wrestle with that, and the fuel spent from nuclear is another issue. Technologies can help us, but we need to develop and take advantage of them. We need to conserve. Overall best for our ecosystem and environment. I hope we are working together to find good compromise and find that perspective. The Governor is clearly on the appropriate side regarding energy. Energy and Environment can be side by side. Middle ground road we can all follow. Doing things to help mitigate in the development, set up mitigation lands, not only on the site, but those adjacent to it too. Do better things for the environment can be win-win. Energy development and conservation and protecting the environment at the same time. Advisory committees like this group give us information from specialists. I like to think we are all the same time, even with different goals: Team Utah. Coming together to talk and discuss in the open and frank talks about challenges to energy in Utah. The attitude of I am right and you are wrong, gets in the way of the team success. What you can get done when you pull together and stop pointing fingers is amazing. There is probably no issue that needs more cooperation than energy development. We need to come with an open mind and unbiased attitude. Find the proverbial win-win. Finding that compromise is probably what we will do to bring benefit to the State and the communities. We need to find new ways that are more environmentally sensible than before. This is going to take work, but we all ought to consider ourselves stewards of the land.

Laura Nelson

- We are charged by the legislatures to come with ideas and find ways to make it work. We have an incredible quality of life. We can weaken both our economy and environment, or we can improve both and energy is critical to protecting our quality of life on all fronts.
- Next forum will be in a couple of months. You can get updates by going to <http://energy.utah.gov> and click on Utah Energy Forum. Also on the website are priorities in energy policy.